

First Report of *Ceratophyllum submersum* L. for Gangetic Plain

Abstract

Ceratophyllum submersum L. (Ceratophyllaceae), collected from Ballia district in Uttar Pradesh is the first report of this species for Gangetic Plain. Three or four times forked leaves and nutlets with a single apical spine distinguish this species from the closely allied *Ceratophyllum demersum* L.

Keywords: *Ceratophyllum submersum*, Ballia, Gangetic Plain

Introduction

Ceratophyllum submersum L. (Ceratophyllaceae) was earlier reported in India only from Chhatrapur of Madhya Pradesh (Duthie, 1903-1922; Kanjilal, 1933; Subramanyam, 1962; Raizada, 1976; Mishra & Shukla, 1997). This species is now reported first time for Gangetic Plain from Ballia district of Uttar Pradesh. Details are provided.

***Ceratophyllum submersum* L.**, Sp. Pl. ed. 2. 1409.1763; Mishra & Shukla in Mudgal, Khanna & Hajra, Fl. Madhya Pradesh 2: 633. 1997.

Aquatic herbs, monoecious, up to 0.5-1.0 m long, submerged in shallow, still or gently flowing water, true root absent; internodes 0.5-2.5 cm long. *Leaves* flaccid, 6-10 whorled, 1.5-2.5 cm long, 3-4 times dichotomously forked, filiform with 7-12 minutely dentate segments at apex. *Flowers* axillary, solitary, sessile, submerged; tepals 6-10, linear, 0.8-

1mm long, greenish-white, ciliate at apex. *Nutlet* ellipsoid or ovoid, compressed, c. 4 mm long, purple-black when ripe with a single soft spine at apex.

Flowering & Fruiting: January-March.

Distribution: Cosmopolitan; India (Madhya Pradesh and Uttar Pradesh), rare.

Specimens Examined: INDIA, **Uttar Pradesh**, Ballia District, Basantpur village, 5-3-05, Sanjay Mishra 21194 (Duthie Herbarium, Department of Botany, University of Allahabad).

Acknowledgements

Authors are grateful to the Head, Botany Department, University of Allahabad, for providing laboratory facilities. The second author thanks the Council of Scientific and Industrial Research (CSIR) for a research fellowship.

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Received: 3.7.2006

Revised and accepted: 10.1.2007